



# DANPATHERM

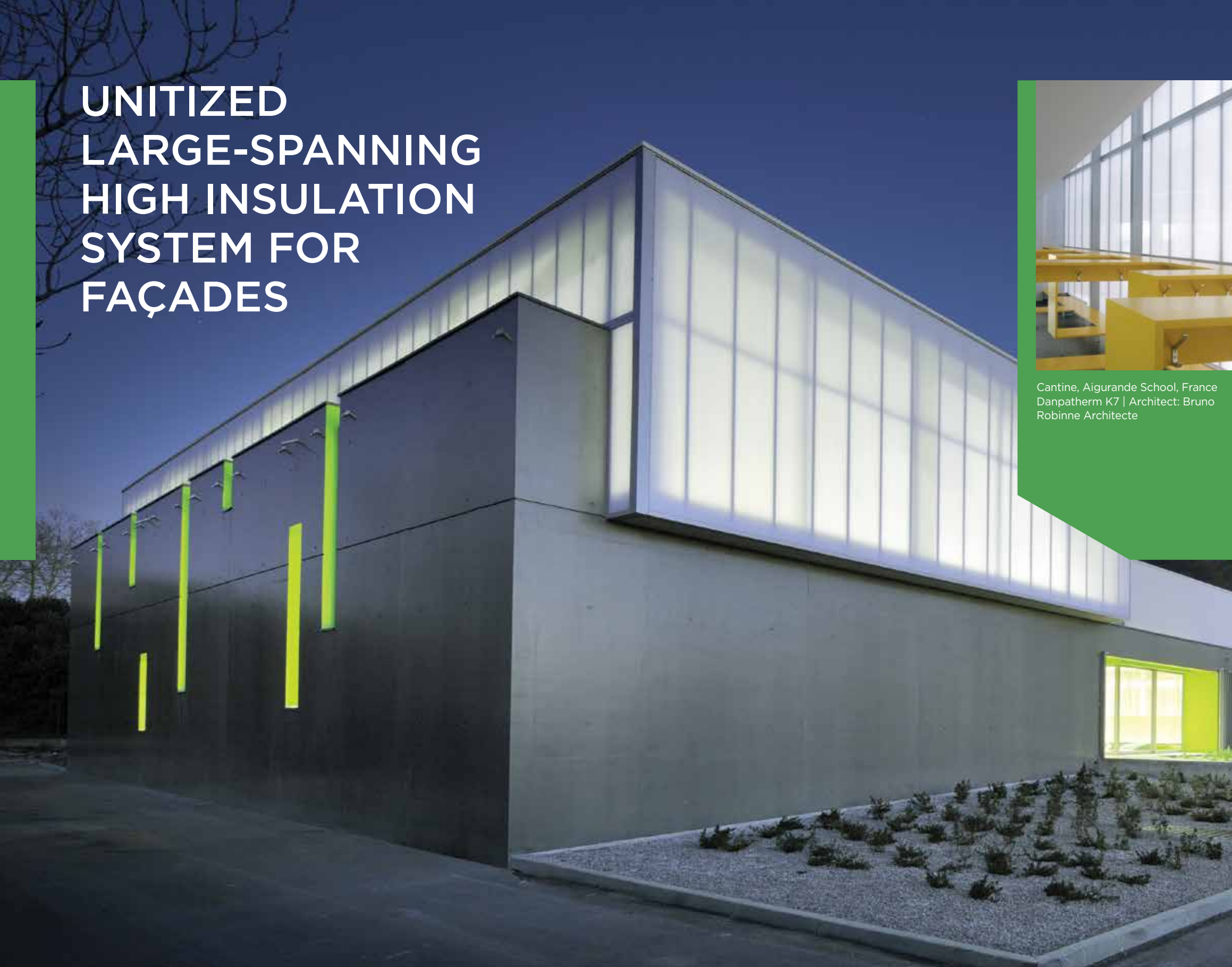
Unitized Large-Spanning High  
Insulation System for Façades



FACADE



# UNITIZED LARGE-SPANNING HIGH INSULATION SYSTEM FOR FAÇADES



Cantine, Aigurande School, France  
Danpatherm K7 | Architect: Bruno  
Robinne Architecte



**AN INNOVATIVE FACTORY  
ASSEMBLED “READY-TO-INSTALL”  
SYSTEM FOR TRANSLUCENT  
FAÇADES OFFERING EXCELLENT  
THERMAL INSULATION**

#### **Unitized System for Clean & Quick Installation**

- Danpatherm is a cassette panel system that is pre-fabricated off-site.
- It is quick and easy to install, reducing labour costs and construction times.
- Danpatherm prevents moisture and dirt penetrating between the panels.
- External panels can be removed if necessary without affecting the building envelope.

#### **Excellent Thermal Insulation, Load Resistance and Spanning Capabilities**

- By including a translucent insulating material in the cavity, this unique double glazing concept can offer U values low as 0.52 W/m<sup>2</sup>K in Danpatherm K12, and 0.83 in Danpatherm K7.
- Danpatherm offers unparalleled wind load resistance and can span more than 3 metres unsupported, significantly reducing requirements for secondary steel framing.



## CREATE INNER CALM WITH SOFT, DIFFUSED LIGHT

Danpatherm double glazing features Softlite, a special finish inherently manufactured into the panels that ensures even transmission of light and eliminates glare. With Softlite, interiors are evenly lit with a gentle and diffused light. Softlite is one of a wide range of finishes offered by Danpal®.



Sports Complexes | France, Danpatherm K7 with HP | Architect: Agence Didier Richard

## DANPATHERM DESCRIPTION



1. Facade frame
2. 2 layers of Danpalon® panels  
600mm wide, 12mm thick
3. Light diffuser insulation



School, Korea | Danpatherm 16x10mm | Architect: Gansam



### SYSTEM BENEFITS

- Exceptional thermal insulation
- Factory pre-assembled cassette
- Quick and easy installation
- Clean look – no visible aluminium
- Variable levels of light transmission
- Unparalleled wind load resistance





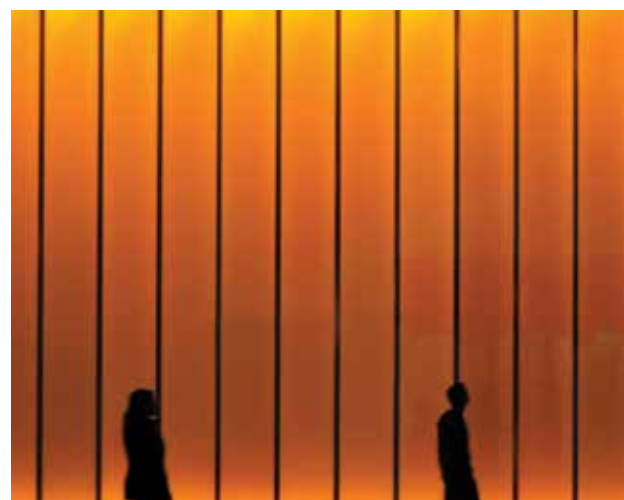
# DANPATHERM LED

ENJOY DAYLIGHT BENEFITS DURING THE DAY.

TURN YOUR BUILDING INTO A LIGHT BOX AT NIGHT.

## Artificial Lighting Inside Danpatherm

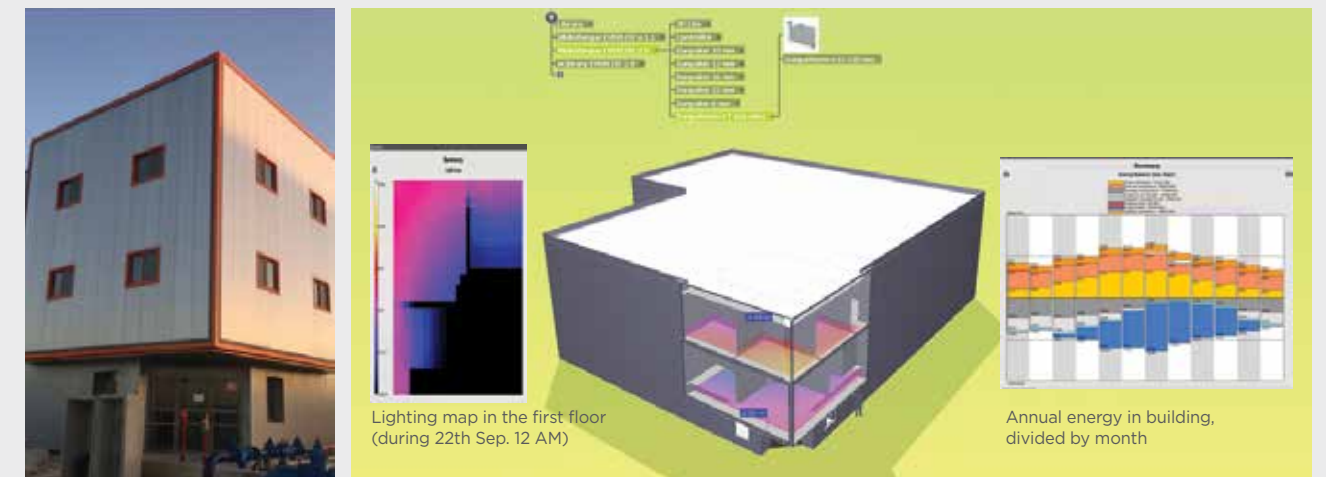
- Pre-fabricated cassette system integrated with a complete LED lighting system
- Long lasting, durable facade system
- Artificial lighting for endless design possibilities at night



## INTERNAL SOLAR AND THERMAL BEHAVIOUR SIMULATION

Danpal® offers a unique tool which can simulate visual and thermal comfort levels for a proposed building design. Using climatic data averages for the location of a given project, Danpal's Smart Energy Simulator can accurately predict internal daylight levels and building energy consumption. This allows the energy cost saving and environmental benefits of using Danpatherm to be quantified early in the design process.

- Dynamic internal daylight map simulation
- Dynamic internal energy consumption simulation

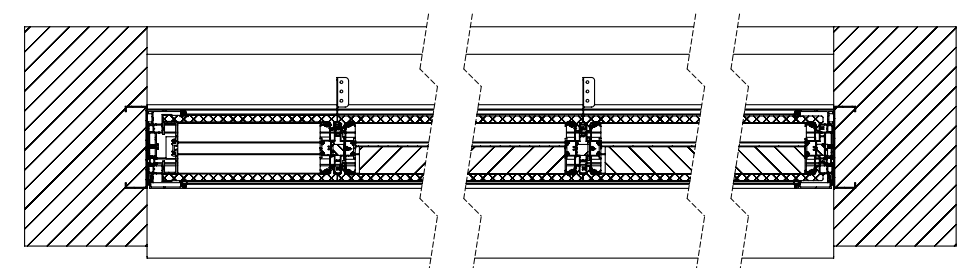


Office building, Israel | Light Simulation

## TECHNICAL FEATURES

PRODUCT	DANPATHERM K7	DANPATHERM K12
Installation module	624mm, 924mm	600mm
Wall structure	12/12 or 12/16mm Polycarbonate panels w/wo insulation	12+12 mm polycarbonate panels with or without insulation
Structure	Honeycomb/multicell	Multicell
Wall thickness	70 mm	120 mm
Cassette length	Standard up to 8 metres	Standard 10.5 meter
U value (W/m <sup>2</sup> K) undisturbed panel	Minimum of 0.75	Minimum of 0.52
Light transmission cassette with insulation	Up to 30%	Up to 24%
Joining method between cassettes	Polycarbonate cover plus screw fixings	Concealed connections
Free span between supports	3 metres	4 metres
10 year warranty	Yes	Yes
Resistance to fire	B- s1, D0	B- s1, D0

## DANPATHERM BETWEEN WALLS - TOP VIEW



## COLOUR YOUR ATMOSPHERE WITH THE DANPAL® PALETTE



### ABOUT THE COMPANY

#### Innovative light architecture systems for building envelopes

Danpal® are creators of exceptional light-transmitting architectural systems for building envelopes, providing optimal solar and thermal comfort.

For over 30 years, our innovative systems have helped architects to transform light (both natural and artificial) into a powerful and versatile tool, for architectural creations that are internally and externally radiant.

An industry visionary, Danpal® are originators of the Danpalon® translucent panel standing seam system - a light architecture solution used around the world in commercial, education, transport, health, sports and high-tech projects.

Today, the company offers complete systems - providing total solutions for the building envelope. Danpal® designs, manufactures and distributes an unmatched range of daylighting systems for all types of building requirements - from facades, cladding, roofs, skylights, shading, to interior and outdoor applications.

Danpal® systems are built around innovative technologies, deep architectural know-how and the ever evolving needs of our clients. Operating in five continents, Danpal® inspires architectural creativity with its rainbow of light architecture solutions.

#### Danpatherm is an integral part of Danpal's range of systems - giving you a complete solution



FACADES



CLADDING



SKYLIGHTS



OUTDOOR



SHADING



INTERIOR

[www.danpal.com](http://www.danpal.com)

**Danpal®**  
Light Architecture